

WHAT IS CLAIMED IS:

1. A sterol ester composition, wherein more than 50% of the fatty acid moieties are
5 MUFAs.

2. The sterol ester composition of Claim 1, wherein from about 55% to about 80% of
the fatty acid moieties are MUFAs.

10 3. The sterol ester composition of Claim 2, wherein from about 60% to about 70% of
the fatty acid moieties are MUFAs.

4. The sterol ester composition of Claim 1, wherein less than about 6% of the fatty
acid moieties are SFAs.

15 5. The sterol ester composition of Claim 4, wherein from about 0.1% to about 4% of
the fatty acid moieties are SFAs.

6. The sterol ester composition of Claim 5, wherein from about 0.5% to about 2% of
20 the fatty acid moieties are SFAs.

7. The sterol ester composition of Claim 6, wherein 50% or less of the fatty acid
moieties are PUFAs.

25 8. A capsule comprising the sterol ester composition of Claim 1.

9. A capsule comprising the sterol ester composition of Claim 2.

10. A capsule comprising the sterol ester composition of Claim 4.

11. A capsule comprising the sterol ester composition of Claim 6.
12. A capsule comprising the sterol ester composition of Claim 7.
- 5 13. A food product comprising the sterol ester composition of Claim 1.
14. The food product of Claim 13, wherein said food product is a salad oil or cooking oil.
- 10 15. The food product of Claim 14, wherein said salad oil or cooking oil comprises from about 5% to about 30% of said sterol ester composition.
16. The food product of Claim 15, wherein said salad oil or cooking oil comprises from about 10% to about 20% of said sterol ester composition.
- 15 17. The food product of Claim 13, wherein said food product is selected from the group consisting of shortenings, peanut butters, peanut spreads, mayonnaise, sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.
- 20 18. A food product comprising the sterol ester composition of Claim 2.
19. The food product of Claim 18, wherein said food product is a salad oil or cooking oil.
- 25 20. The food product of Claim 19, wherein said salad oil or cooking oil comprises from about 5% to about 30% of said sterol ester composition.
21. The food product of Claim 20, wherein said salad oil or cooking oil comprises from about 10% to about 20% of said sterol ester composition.

22. The food product of Claim 18, wherein said food product is selected from the group consisting of shortenings, peanut butters, peanut spreads, mayonnaise, sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.

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23. A food product comprising the sterol ester composition of Claim 4.
 24. The food product of Claim 23, wherein said food product is a salad oil or cooking oil.

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25. The food product of Claim 24, wherein said salad oil or cooking oil comprises about 5% to about 30% of said sterol ester composition.

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26. The food product of Claim 25, wherein said salad oil or cooking oil comprises from about 10% to about 20% of said sterol ester composition.

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27. The food product of Claim 23, wherein said food product is selected from the group consisting of shortenings, peanut butters, peanut spreads, mayonnaise, sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.

20 sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.

28. A food product comprising the sterol ester composition of Claim 6.

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29. The food product of Claim 28, wherein said food product is a salad oil or cooking oil.

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31. The food product of Claim 30, wherein said salad oil or cooking oil comprises from about 10% to about 20% of said sterol ester composition.

32. The food product of Claim 28, wherein said food product is selected from the group consisting of shortenings, peanut butters, peanut spreads, mayonnaise, sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.

33. A food product comprising the sterol ester composition of Claim 7.

34. The food product of Claim 33, wherein said food product is a salad oil or cooking oil.

35. The food product of Claim 34, wherein said salad oil or cooking oil comprises from about 5% to about 30% of said sterol ester composition.

36. The food product of Claim 35, wherein said salad oil or cooking oil comprises from about 10% to about 20% of said sterol ester composition.

37. The food product of Claim 33, wherein said food product is selected from the group consisting of shortenings, peanut butters, peanut spreads, mayonnaise, sauces, gravies, margarine, health bars, snacks, beverages, ice cream, yogurt, cake mix, frosting, donuts, baked goods, cheese, and cheese spreads.

38. The sterol ester composition of Claim 1, 2, 4, 6, or 7, wherein the free sterol level is less than about 10%.

39. The sterol ester composition of Claim 38, wherein the free sterol level is less than about 5%.

40. The sterol ester composition of Claim 39, wherein the free sterol level is less than about 3%.

5 41. A salad oil or cooking oil that is free of solids at temperatures of greater than about 60°F and that comprises more than about 10% sterol esters.

10 42. A method for preparing the sterol ester composition of Claim 1, comprising subjecting a sterol ester mixture to a fractionating process selected from the group consisting of solvent fractionation and fractional distillation of the fatty acid lower alkyl esters.

15 43. The method of Claim 42, wherein the sterol ester mixture is produced by esterifying a fatty acid mixture with free sterol by a direct esterification method selected from the group consisting of catalytic esterification and enzymatic esterification.

20 44. The method of Claim 42, wherein the sterol ester mixture is produced by esterifying an alcohol ester of a fatty acid mixture with free sterol in the presence of an interesterification catalyst.

25 45. A method for preparing the sterol ester composition of Claim 1, comprising fractionating a mixture of sterol ester and vegetable oil.

46. A method for preparing the sterol ester composition of Claim 1, comprising:

- 25 (a) esterifying a sterol with an excessive amount of a fatty acid alcohol ester in the presence of an interesterification catalyst; and
 (b) fractionating the sterol fatty acid ester in the fatty acid alcohol ester to obtain the sterol ester composition.

47. The method of Claim 42, comprising the additional steps of washing, drying, and bleaching the sterol fatty acid ester and fatty acid alcohol ester mixture before the fractionating process.

5 48. A method for preparing the sterol ester composition of Claim 1, comprising:

- (a) providing fatty acid esters;
- (b) preparing a sterol ester mixture;
- (c) refining the sterol ester mixture;
- (d) evaporating and stripping the sterol ester mixture; and

10 (e) fractionating the sterol ester mixture to obtain the sterol ester composition.

49. A method for preparing the sterol ester composition of Claim 1, comprising:

- (a) providing fatty acid esters;
- (b) preparing a sterol ester mixture;
- (c) refining the sterol ester mixture;
- (d) evaporating and stripping the sterol ester mixture;
- (e) adding a nucleating agent; and

(e) fractionating the sterol ester mixture to obtain the sterol ester composition.

20 50. A method for preparing a salad oil or cooking oil comprising the sterol ester composition of Claim 1, comprising:

- (a) interesterifying a sterol and an edible oil with an excess amount of fatty acid alcohol ester in the presence of an interesterification catalyst to form a sterol fatty acid ester mixture; and
- (b) fractionating the sterol fatty acid ester mixture to obtain the salad oil or cooking oil.

51. The capsule of Claim 8, 9, 10, 11, or 12, wherein the sterol ester composition has a free sterol level of less than about 10%.

52. The capsule of Claim 51, wherein the sterol ester composition has a free sterol level of less than about 5%.

53. The capsule of Claim 52, wherein the sterol ester composition has a free sterol level of less than about 3%.

54. The food product of Claim 13, 18, 23, 28, or 33, wherein the sterol ester composition has a free sterol level of less than about 10%.

10 55. The food product of Claim 54, wherein the sterol ester composition has a free sterol level of less than about 5%.

56. The food product of Claim 55, wherein the sterol ester composition has a free sterol level of less than about 3%.

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